

**Amendments to the Specification:**

Please replace the following paragraphs of the Substitute Specification, with the following amended paragraphs:

[0013] Electrodes that are inert to anodic dissolution are conventionally used in electrokinetic soil remediation. These include graphite, platinum, gold and silver electrodes, although less expensive electrodes made from titanium, stainless steel and plastic have also been employed. Metals such as lead, chromium, cadmium, copper, uranium, mercury and zinc, as well as polychlorinated biphenyls, phenols, chlorophenols, toluene, ~~trichloroethane~~ trichlorethane and acetic acid are suitable for electrokinetic remediation and recovery.

[0045] The natural moisture content of the untreated sediment was 97%, compared to 69% and 88% for the anode and cathode zones respectively, consistent with the extraction of purged hydrocarbon-rich effluent from the cathode zone, and electro-osmotic flow of the water from the anode to cathode zone. The bulk density of the cathode zone was recorded at ~~1.47Mg/m<sup>3</sup>~~ 1.47mg/m<sup>3</sup> (wet), ~~0.78Mg/m<sup>3</sup>~~ 0.78mg/m<sup>3</sup> (dry), specific gravity 2.59. Anode zone bulk density was recorded at ~~1.49/m<sup>3</sup>~~ 1.49 mg/m<sup>3</sup> (wet) and ~~0.88 Mg/m<sup>3</sup>~~ 0.88 mg/m<sup>3</sup> (dry), specific gravity 2.62. These differences in physical properties between the anodic and cathodic zone are

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consistent with the addition of iron to anodic zone sediment, during the experiment. The hand vane shear strength of the anode sediments is ~~2.45 K Pa~~ 2.45 kPa, compared to zero for cathode zone and untreated sediment. This indicates a significant improvement in the engineering properties of the anode zone sediments as a consequence of electro-osmotic dewatering, accompanied by precipitation.